

POLYGONUM AVICULARE SUBSP. RURIVAGUM (POLYGONACEAE) IN NORTH AMERICA

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ABSTRACT

The occurrence of *Polygonum aviculare* subsp. *rurivagum* in North America is confirmed. The taxon is a rare adventive from Europe growing in sunny, dry and trampled ruderal habitats.

RESUMEN

La presencia de *Polygonum aviculare* subsp. *rurivagum* en Norteamérica es confirmada. Es un taxon raro originario de Europa que crece en lugares ruderales, soleados, secos y pisoteados.

The occurrence of the European *Polygonum aviculare* L. subsp. *rurivagum* (Jord. ex Boreau) Berher in North America has been uncertain. Löve and Löve (1956) reported it from eastern North America but they did not indicate any location. Furthermore, their results have been generally disregarded because of some doubtful chromosome counts, and because no specimens or vouchers have been quoted or found (e.g., Mertens & Raven 1965; Wolf & McNeill 1986). During the preparation of the genus *Polygonum* for Flora of North America we have encountered this taxon in scattered locations in North America and we compared it with European material. Some relatively recent European floras and treatments of *Polygonum* have preferred to treat this taxon as a species (*P. rurivagum* Jord. ex Boreau, e.g., Akeroyd 1993; Do Amaral Franco & Da Luz Rocha Afonso 1995; Stace 1997) following the study of Styles (1962). Nevertheless, its classification under *P. aviculare* is apparently the best solution (Karlsson 2000; Costea & Tardif 2003). It is a rare but homogenous taxon. Its extreme morphology, with pauciflorous cymes (1–3 flowers), small flowers, 2.3–3.2 mm, and narrow-elliptic to linear-lanceolate leaves, 1.5–5 mm wide, brings it close to *P. aviculare* subsp. *neglectum* (Besser) Arcang., with which it has been frequently misidentified. The subsp. *rurivagum* differs by the long ochreas, 8–12.5 mm, with strong veins and the free part disintegrating into persistent fibers, and by the leaves with lateral veins strongly raised on the abaxial part of the leaves. The subspecies *neglectum* has ochreas of 4–8 mm, with inconspicuous veins and free part leaving almost no fibrous remains and leaves without strongly raised lateral veins. For differences between subsp. *rurivagum* and the other subspecies of *P.*

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aviculare from North America see Costea and Tardif (2003). For iconography see Raffaelli (1982, Fig. 12), Karlsson (2000, Fig. 96). The plant grows as a ruderal in dry, sunny and often trampled habitats, in pavement cracks, gravel and sandy places. Flowering occurs from June to October.

Typical specimens examined: **CANADA. ALBERTA:** S of Cypress Hills, barren flats and roadside ditch, 16 Aug 1951, *E.H. Moss* 9632 (ALTA); 2.25 mi S of Fort Saskatchewan, 8 Aug 1944, *E.H. Moss & G.H. Turner* 6642 (ALTA, DAO); Ma-Me-O Beach, edge of paved highway, 33 Jul 1957, *G.H. Turner* 9535 (ALTA, DAO). **MANITOBA:** Otterburne, en bordure de la voie ferrée, au nord de la localité, 13 Aug 1956, *J.-P. Bernard* 5586a (QFA). **NEW BRUNSWICK. Cloucesster Co.:** near Caraquet, on riverbank, 22 Jul 1945, *W.G. Dore & E. Gorham* 45753 (MT). **NEW FOUNDLAND. Hermitage Distr.:** Harbor Breton, brackish pond behind beach, muddy gravelly shore, 19 Jul 1989, *A. Bouchard et al.* 89250 (MT). **QUEBEC. Comté de Bagot:** St-Pie, 40°30'N, 72°54'W, sous le pont traversant la rivière Yamaska; terrain vague, près des piliers du pont du côté est de la rivière, avec *Polygonum ramosissimum*, 12 Sep 1992, *M. Blondeau* 92154 (QFA). **Comté de Rimouski:** Le Bic, prairie saumâtre avec: *Salicornia*, *Spartina patens*, *Limonium*, etc., 16 Aug 1962, *Rolland-Germain* 8202 (MT). **SASKATCHEWAN. Regina Distr.:** Regina, disturbed empty lot N of Luther Care Home, 21 Aug 2000, *G.F. Ledingham* 13707 (USAS).

U.S.A. CALIFORNIA. Kern Co.: Breckenridge Mountain Road, at the S fork of Lucas Creek, 1833 m, yellow pine forest, 27 Jul 1965, *E.C. Twisselmann* 11182 (CAS). **Sonoma Co.:** near Kenwood, 18 Sep 1932, *J.T. Howell* 10780 (CAS). **INDIANA. Howard Co.:** E of Kokomo, in dry cindery soil, 22 Jul 1941, "*Chas. M. Ek.*" s.n. (NY). **IOWA. Marion Co.:** Knoxville Twp., wet clay adjacent to water in strip mine, 23 Jul 1957, *T.V. Bruggen* s.n. (DAO). **MAINE. Androscoggin Co.:** Valley of Androscoggin River, S of Pollard, 1895, *K. Furbish* s.n. (GH). **Aroostook Co.:** Valley of Meduxnekeag River, roadside, 12 Aug 1909, *M.L. Fernald* s.n. (GH). **Cumberland Co.:** Brunswick, Sep 1891, *K. Furbish* s.n. (GH). **MASSACHUSETTS. Hampshire Co.:** Ryan Road, Northampton, waste ground, gravel pit, 11 Aug 1978, *H.E. Ahles* 86179 (QFA). **Middlesex Co.:** N of Woburn, 1951, *G.H. Hilton* s.n. (GH). **Worcester Co.:** S of Royalston, 1907, *J.A. Bates* s.n. (GH). **NEW YORK:** New York City, near Van Cortland Park, in sandy soil, 17 Jul 1891, *E.P. Bicknell* s.n. (NY). **Rhode Island. Providence Co.:** Elmwood, 30 Aug 1893, *J.F. Collins* s.n. (GH). **(SOUTH?) DAKOTA:** (Augustana?) College, 1889, *J.C. Zuffey* s.n. (US). **WEST VIRGINIA. Hardy Co.:** immediately E of Trout Run in cleared area leading to automatic Beacon Tower, 9 Aug 1941, *H.A. Allard* 9389 (US).

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